

an organic light emission layer for EL emission sandwiched between said first and second electrode layers for supplying prescribed electric fields to said organic light emission layer, wherein

at least said first electrode layer includes a plurality of electrodes arranged with spatial periodicity, and

said plurality of electrodes included in said first electrode layer together with adjacent regions in said second electrode layer including at least one electrode form a plurality of electrode pair regions arranged with spatial periodicity,

a method comprising driving said organic EL emission device so that said prescribed electric fields different from each other in at least either strength or polarity are applied with variation in a time-dependent manner to electrode pair regions adjacent to each other among said plurality of electrodes pair regions, so as to allow a half or less than a half of the total number of electrode pair regions to emit light at a time.

#### REMARKS

A CPA is filed herewith, responsive to the Office Action dated October 10, 2001. Claim 11 has been canceled. Claims 1-10 and 12 are pending. Attached hereto is a marked-up version of the changes made to the claims by the current amendment. The attached page(s) is captioned "Version With Markings To Show Changes Made."

Certain example embodiments of the instant invention, for purposes of example and without limitation, relate to a method and system for driving an organic EL emission device. An example EL device includes electrode layer 2 and electrode layer 5 provided on opposite sides of light emission layer 4. Opposing segments from electrode layer 2

and electrode layer 5 form "electrode pair regions". Four such electrode pair regions are illustrated in Figure 1. Likewise, four different electrode pair regions are illustrated in the Figure 2 embodiment (i.e., electrode pair regions P1, P2, P3 and P4). As shown in Fig. 1, voltage from source 7 is applied to the different electrode pair regions so that the voltage across a first electrode pair region may be opposite in polarity to the voltage across an adjacent electrode pair region (page 7, lines 9-15). For example, Figure 3 illustrates that electrodes s1 and s2 (which define adjacent electrode pair regions with corresponding electrodes c1, c2) are always subject to a drive voltage with opposite polarity. As explained on page 10 of the instant application, deterioration of the light emission panel due to charge accumulation can be reduced or prevented by the claimed feature of applying electric fields which differ in strength and/or polarity to adjacent electrode pair regions.

Claims 1-10 and 12 stand rejected under 35 U.S.C. §102(e) as being allegedly anticipated by Kono. This §102(e) rejection is respectfully traversed for at least the following reasons.

Claims 1 requires: (1) the first and second electrode layers together supply electric fields to the organic light emission layer located therebetween; and 2) the prescribed electric fields are substantially always different from one another in terms of strength and/or polarity in adjacent electrode pair regions. The cited Kono reference fails to disclose or suggest either of these features.

Kono discloses an EL display device. The Office Action contends that the first electrode layer of claim 1 is met by electrode 19 (see the front page of Kono) and the

second electrode layer of claim 1 is met by electrodes 20, 22 in Kono. However, in Kono electrode 19 and electrodes 20, 22 are part of two different EL panels. First EL panel 12 includes electrodes 15 and 19, while a different second EL panel includes electrodes 20 and 22. Thus, for example, electrodes 19 and 22 cannot satisfy the respective first and second electrode layers of claim 1, because electrodes 19 and 22 in Kono do not function together to supply an electric field across any light emission layer (instead, these electrodes are on different EL panels).

As mentioned above, first EL panel 12 of Kono includes electrodes 15 and 19. Figure 4 illustrates that the electric fields applied by these electrodes 15, 19 are the same in adjacent electrode pair regions. Likewise, Figure 7 illustrates that the electric fields applied by electrode pairs 20, 22 are also the same in adjacent electrode pair regions. The electric fields of Kono clearly do not differ with regard to strength and/or polarity in adjacent electrode pair regions as required by claim 1. Instead, Kono teaches directly away from the instant claimed invention by utilizing electric fields in adjacent electrode pair regions which are of the same strength and polarity. Kono cannot possibly anticipate or render obvious claim 1.

For at least the foregoing reasons, it is respectfully requested that all rejections be withdrawn and the instant application passed to issue. If any minor matter remains to be resolved, the Examiner is invited to telephone the undersigned with regard to the same.

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Respectfully submitted,

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**VERSION WITH MARKINGS TO SHOW CHANGES MADE**

**IN THE CLAIMS**

1. (Amended) In an organic EL emission device comprising:

first and second electrode layers, at least one of which is transparent,

an organic light emission layer for EL emission sandwiched between said first and second electrode layers for together supplying prescribed electric fields to said organic light emission layer, wherein

at least said first electrode layer includes a plurality of electrodes arranged with spatial periodicity, and

said plurality of electrodes included in said first electrode layer together with adjacent regions in said second electrode layer including at least one electrode form a plurality of electrode pair regions arranged with spatial periodicity,

a method comprising driving said organic EL emission device in a manner such that said prescribed electric fields are substantially always different from each other in at least either strengths or [directions] polarity as applied with variation in a time-dependent manner to electrode pair regions adjacent to each other among said plurality of electrode pair regions.

2. (Amended) The method of driving the organic EL emission device according to claim 1, wherein electric fields with at least either different strengths or [directions]

polarity to be applied to electrode pair regions adjacent to each other among said plurality of electrode pair regions are varied with a constant time periodicity.

10. (Amended) An organic EL emission device, comprising:

first and second electrode layers, at least one of which is transparent;

an organic light emission layer for EL emission sandwiched between said first and second electrode layers, said first and second electrode layers for supplying prescribed electric fields to said organic light emission layer; and

voltage application means for applying a voltage between an electrode included in said first electrode layer and an electrode included in said second electrode layer, wherein

at least said first electrode layer includes a plurality of electrodes arranged with spatial periodicity,

said plurality of electrodes included in said first electrode layer together with adjacent regions in said second electrode layer including at least one electrode form a plurality of electrode pair regions arranged with spatial periodicity, and

said voltage application means applies said prescribed electric fields in a manner such that said prescribed electric fields are substantially always different from one another in at least either [strengths or directions] strength or polarity in adjacent electrode pair regions and vary in a time-dependent manner.

12. (Amended) In an organic EL emission device comprising:

first and second electrode layers, at least one of which is transparent, and

an organic light emission layer for EL emission sandwiched between said first and second electrode layers for supplying prescribed electric fields to said organic light emission layer, wherein

at least said first electrode layer includes a plurality of electrodes arranged with spatial periodicity, and

said plurality of electrodes included in said first electrode layer together with adjacent regions in said second electrode layer including at least one electrode form a plurality of electrode pair regions arranged with spatial periodicity,

a method comprising driving said organic EL emission device so that said prescribed electric fields different from each other in at least either [strengths or directions] strength or polarity are applied with variation in a time-dependent manner to electrode pair regions adjacent to each other among said plurality of electrodes pair regions, so as to allow a half or less than a half of the total number of electrode pair regions to emit light at a time.